

the specification was objected to over an informality; and
pending claims 5-9 were rejected.

In this Response:

the specification was amended
to correct the informality, and
to properly claim the benefit of an earlier filing date in a foreign
country;
regarding the claims,
claim 5 has been amended;
claim 8 has been canceled without prejudice; and
claim 9 has been amended to depend from claim 5.

Claims 5-7, 9 are now pending in the present application. Reconsideration is requested. In addition to the above amendments, the Applicant makes the following remarks regarding individual issues:

* Foreign Priority

Along with the Patent Application, the Applicant also mailed a copy of a Foreign Priority Document. The Office Action did not acknowledge receipt of the same. The Applicant inquires if this was in error.

* The first 35 U.S.C. § 103(a) rejection:

The Examiner rejected claims 5-7 under 35 U.S.C. § 103(a) as being unpatentable over U.S. Patent No. 4,764,479 to Kosa et al. in view of the Admitted Prior Art (APA).

The rejection is respectfully traversed, although it is believed that it has become moot by the Applicant's amendment to claim 5 (all the other pending claims depend from claim 5).

Specifically, claim 5 has been amended to claim in pertinent part:

...

an impurity implantation region of impurities of a second conductive-type formed in a first sector of the channel region, *the first sector not reaching either one of the source region and the drain region ... ; ...*

The italicized portion of the above is a new feature of the invention, not taught by Kosa or the APA. New features are unobvious under 103(a).

In view of the foregoing, the Applicant requests that that rejection be withdrawn.

* The second 35 U.S.C. § 103(a) rejection:

The Examiner rejected claims 5-9 under 35 U.S.C. § 103(a) as being unpatentable over U.S. Patent No. 5,917,219 to Nandakumar et al. in view of the Admitted Prior Art (APA).

The rejection is respectfully traversed, although it is believed that it has become moot by the Applicant's amendment to claim 5 (all the other pending claims depend from claim 5).

Specifically, claim 5 has been amended to claim in pertinent part:

...

a semiconductor substrate of a first conductive-type;
a source region and a drain region of a second conductive type formed in the substrate and defining between them a channel region ... ;
an impurity implantation region of impurities of a second conductive-type formed in a first sector of the channel region, ... *wherein the channel region exclusive of the first sector has a uniform doping concentration of the first conductive type; ...*

The italicized portion of the above is a new feature of the invention, not taught by Nandakumar et al. or the APA. New features are unobvious under 103(a).

Indeed, Nandakumar's Fig. 3A teaches a device whose doping concentrations are non-uniform. Portions 64 are p+, while the channel region under portion 66 is p-. Indeed, their rapidly changing variations are plotted in Figs 3B, 3C. As for Fig. 3 of the APA, element 46 does not have uniform doping concentration with substrate 30.

In view of the foregoing, the Applicant requests that that rejection be withdrawn.

CONCLUSION

The Applicant respectfully submits that the rejection of the pending claims must be withdrawn, and that this application is in condition for allowance. Such is respectfully requested.

I hereby certify that this correspondence is being deposited with the United States Postal Service as first class mail in an envelope addressed to: Commissioner of Patents and Trademarks, Washington, D.C. 20231

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By



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